

Appl. No. 10/605,653
Amdt. dated May 21, 2006
Reply to Office action of February 23, 2006

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

5 **Listing of Claims:**

Claim 1 (currently amended): A backlight module comprising:

- a plurality of point light source generators, the point light source generators being light emitting diodes (LEDs);
- 10 a diffusing plate installed atop the plurality of point light source generators for scattering the light generated by the plurality of point light source generators, the diffusing plate further comprising a plurality of scattering particles formed inside the diffusing plate to uniform the light generated by the point light source generators;
- 15 a plurality of scattering apertures installed on the surface of the diffusing plate opposite to the plurality of point light source generators, wherein one or more scattering pattern is disposed over the inner wall of at least one scattering aperture, and the scattering aperture is trapezoidal in shape; and
- 20 a diffusing sheet installed above the diffusing plate for diffusing the light emitted from the diffusing plate;
- wherein the number of the scattering apertures correspond to the number of the point light source generators, and the position of each scattering aperture corresponds to the position of each point
- 25 light source generator.

Claims 2-8 (cancelled)

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Claim 9 (previously presented): The backlight module of claim 1 wherein the plurality of scattering patterns comprises a plurality of V-trenches or a plurality of arc trenches.

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Claim 10 (cancelled)

Claim 11 (previously presented): The backlight module of claim 1 further comprising at least one prism sheet installed above the diffusing sheet for
10 uniforming the light diffused by the diffusing sheet.

Claim 12 (original): The backlight module of claim 1 further comprising at least one brightness enhancement film installed above the diffusing plate for enhancing the brightness of the backlight module.

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Claim 13 (original): The backlight module of claim 1 further comprising a reflecting plate installed under the plurality of point light source generators for reflecting the light generated by the plurality of point light source generators to the diffusing plate.

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Claim 14 (previously presented): The backlight module of claim 1 wherein each of the inner walls of the scattering apertures has the scattering pattern.

25 Claim 15 (previously presented): The backlight module of claim 14 wherein the scattering patterns disposed over the inner walls are the same pattern.

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Claim 16 (previously presented): The backlight module of claim 14 wherein the scattering patterns disposed over the inner walls are different patterns.

- 5 Claim 17 (currently amended): A direct type backlight module comprising:
a plurality of point light source generators;
a diffusing plate installed atop the plurality of point light source
generators for scattering the light generated by the plurality of
point light source generators, the diffusing plate further
10 comprising a plurality of scattering particles formed inside the
diffusing plate to uniform the light generated by the point light
source generators;
a plurality of scattering apertures installed on the surface of the
diffusing plate facing the plurality of point light source
15 generators, wherein a plurality of scattering pattern is disposed
over the inner wall of at least one scattering aperture, and the
scattering patterns are different patterns; and
a diffusing sheet installed above the diffusing plate for diffusing the
light emitted from the diffusing plate.

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